REMARKS

Applicants thank the Examiner for the thorough consideration given the present application. Claims 1-13 are pending, of which claims 1, 4, 7, and 11-13 are independent. Claims 3, 7, 9, and 10 are amended to consistency. Claim 7 is further amended to address a minor informality.

Applicants traverse the rejection of claims 1-3 under 35 U.S.C. §101 as being directed to non-statutory subject matter. Applicants do not agree that the steps of claims 1-3 "can be practiced mentally in conjunction with pen and paper." A pen and paper cannot operate a peripheral device of any type, particularly a peripheral device enabled to communicate using a SCSI protocol, as claim 1 requires. A pen and paper cannot receive a SCSI command write/read signal and/or a SCSI inquiry signal, as claim 1 requires. A pen and paper cannot initiate a response to the SCSI inquiry signal for a predetermined time period in response to receipt of the previously mentioned received SCSI signals, as claim 1 requires. A pen and paper cannot set a delay timer and enter a delay mode, as claim 2 requires. A pen and paper cannot perform a host selection procedure or data transfer, as claim 3 requires. The rejection of claims 1-3 based on 35 U.S.C. §101 must be withdrawn unless the Examiner can explain how a pen and paper or a mental process can perform the foregoing steps of claims 1-3.

Applicants traverse the rejections under 35 U.S.C. §103(a) of claims 1, 2, 4, 5, 7-9, 12, and 13 as being unpatentable over Hughes (U.S. 6,493,772) and of claims 3, 6, 10, and 11 as being obvious from Hughes in view of Latif et al. (U.S. 5,613,076).

Hughes describes a SCSI controller connected to a host computer and to a plurality of peripherals, such as disk drives (*column 5, lines 1-13*). The SCSI controller receives commands from the host computer and places a data structure corresponding to each command in an "execution queue" (*column 8, lines 18-22 and 36-37*). The progress of each command can then be monitored by inspecting the execution queue. Hughes further describes tracking certain types of commands (e.g., read/write) to determine whether a command has been completed within a predetermined amount of time (*column 9, lines 17-26*). If a command has not been completed within the time allotted, the corresponding data structure is removed from the queue, and a "busy" status code is returned to the host computer (*column 10, lines 28-45*).

Although conceding Hughes does not disclose a peripheral device that delays responding to a SCSI inquiry signal for a predetermined period, the Office Action nonetheless maintains that support for delaying can be found in Hughes at column 9, lines 35-39, and column 11, lines 49-55.

However, column 9, lines 35-39, merely state that the time required for the SCSI controller to issue a status code to the host

computer depends on the time taken to inspect the execution queue; no purposive delay in issuing the status code is described. According to column 11, lines 49-55, during data transfer between the SCSI controller and the host computer, the host computer must wait until sufficient cache on the SCSI controller becomes available. Although data transfer is delayed whenever insufficient cache is available, the delay is not for a predetermined period. Instead, the delay varies according to how long it takes for the necessary cache to become available.

Once a period is set by Hughes, it does not become "determined" or "predetermined." Hughes describes a delay in data transfer between the host computer and the SCSI controller whenever insufficient cache is available on the SCSI controller. As noted, the delay is not of a determined or predetermined period set by the SCSI controller or host computer. Instead, the SCSI controller and host computer simply wait for an unknown period of time until sufficient cache becomes available, e.g., after the SCSI controller has sent cached data to a peripheral device. The period of time which the SCSI controller and host computer must wait may depend upon several factors, e.g., the number of peripheral devices, the size of the data being transferred, the size of the cache, etc.

The situation is perhaps analogous to hailing a cab: One simply has to wait until a vacant cab passes. A prospective

passenger has no idea how long s/he will have to wait before actually finding a vacant cab. The period of time spent waiting cannot be regarded as "determined" or "predetermined" and may depend on several factors, including the total number of cabs in the area, time of day, number of passengers in a party, etc. Similarly, the delay described by Hughes is not of a determined or predetermined period, since it is not known how long the SCSI controller and host computer must wait before sufficient cache becomes available. Clearly, the cited passage of Hughes does not describe delaying by a predetermined period, as required by Applicants' independent claim 1.

In fact, the text relied upon in the Office Action relates to operation of the SCSI controller and host computer. There is no reference whatsoever to operating a peripheral device. In this regard, independent claim 1 is directed to a method of operating a peripheral device, which includes the step of delaying, for a predetermined period, a response by the peripheral device. Hughes is primarily concerned with a SCSI controller; no mention is made of any special operations to be performed by the peripheral devices. Hughes, therefore, fails to disclose or suggest a method involving a *peripheral device* delaying a response to a SCSI signal.

Claim 1 also requires that the peripheral device delays responding to an inquiry signal in response to receipt of a write/read

signal and an inquiry signal. Not only does Hughes fail to disclose or suggest a peripheral device that delays responding to an *inquiry signal*, but there is also no disclosure or suggestion of delaying the response when both a *write/read signal* and an *inquiry signal* are received.

It should be noted that a SCSI controller (also known as a SCSI host adapter) is a device used to control data transfer between a host computer and one or more SCSI peripheral devices and cannot be considered a peripheral device, as implied in the Office Action. Since a SCSI is a systems-level interface, each peripheral device has its own controller. The SCSI controller (or SCSI host adapter) acts as the gateway between the SCSI bus and the internal I/O bus of a host computer. A SCSI controller sends and responds to commands and transfers data to and from peripheral devices on the SCSI bus to the host computer. The SCSI controller usually resides within the host computer, e.g., forming part of the motherboard or provided on a card (e.g., PCI card). Therefore, contrary to the suggestion in the Office Action, the SCSI controller is not a peripheral device *per se*.

It is clear from column 5, lines 1-16, and FIG. 3 of Hughes that the device controller 300 is a SCSI host adapter that acts as a gateway between the computer I/O bus 305 and the SCSI bus 325. Furthermore, device controller 300 connects SCSI peripheral devices 330, 335 to a host computer (not shown). The Office Action incorrectly alleges that

the SCSI device controller 300 described by Hughes is a SCSI peripheral device.

At the end of item 4, the Office Action contends it would have been obvious to one of ordinary skill in the art to "apply the teachings of Hughes because Hughes' delaying would guarantee that a status corresponding to a command initiated by a *host system* is sent to the *host system* within a maximum command response time." It is not clear what the Office Action implies by this statement. A command (e.g., a write/read command) is first issued by a host computer to a peripheral device. The peripheral device upon completing the command returns a status code to the host computer, e.g., good, condition met, busy, etc. (*column 1, line 61, through column 2, line 6*). Hughes describes a SCSI controller that monitors commands issued by the host computer. Should a particular command not be completed within a predetermined time (i.e., the maximum command response time), the SCSI controller returns a 'busy' status code to the host computer. There is no suggestion by Hughes whatsoever that a peripheral device should delay before responding to a command. Indeed, it is clear that if a peripheral device were to delay in responding to a command, the SCSI controller responsible for monitoring the command would issue a "busy" status code to the host computer. In other words, the peripheral device would continually appear to be busy. Therefore, it would not have been obvious to one of ordinary skill in the art to have modified

the system described by Hughes such that peripheral devices delay responding to SCSI commands since the peripheral device would continually appear to be busy.

For at least the above reasons, it is submitted that claim 1 is not rendered obvious by Hughes.

With the exception of claim 11, the remaining claims either depend from claim 1 or include the same inventive features as claim 1. In particular, all independent claims, with the exception of claim 11, include the feature of delaying a response to an inquiry signal for a predetermined time in response to receipt of a write/read signal and an inquiry signal.

With regard to claim 11, neither Hughes nor Latif describes transferring data between a host computer and a peripheral device during the bus-free periods that exist within an *inquiry period*. The bus-free period described by Latif is the normal bus-free period that exists prior to an initiator (e.g., host computer) winning arbitration for control of the SCSI bus. After winning arbitration, the initiator selects a target (e.g., disk drive) and a data transfer takes place between the target and the initiator. Once the data transfer has been completed, the initiator relinquishes control of the SCSI bus and a bus-free period resumes (*column 3, lines 21-35*). The bus-free period described by Latif, therefore, exists only when no device has yet arbitrated for control of the SCSI bus. With claim 11, on the other

hand, data transfer occurs during a bus-free period that exists *after* arbitration and target selection. Moreover, data transfer takes place during a bus-free period within an *inquiry period* that results from an inquiry command. Since neither Hughes nor Latif discloses or suggests transferring data during a bus-free period of an inquiry period, claim 11 is not rendered obvious.

In view of the foregoing, favorable reconsideration and allowance are deemed in order.

To the extent necessary during prosecution, Applicants hereby request any required extension of time not otherwise requested and hereby authorize the Commissioner to charge any prescribed fees not otherwise provided for, including application processing, extension of time, and extra claims fees, to Deposit Account No. 08-2025.

Respectfully submitted,
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